



California Department of
Pesticide Regulation

A SUSTAINABLE FUTURE FOR PEST MANAGEMENT

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SPM Executive Leadership at DPR

DPR added an executive leadership position to lead its statewide collaboration and coordination to foster SPM across California's urban, agricultural and wildland settings





DPR's Mission

We protect people and the environment by fostering sustainable pest management and regulating pesticides.



DPR's Vision

A California where pest management is safe, effective, and sustainable for everyone.

WHAT WE DO





Sustainable Pest Management (SPM)

Sustainable Pest Management (SPM) is a **holistic, whole-system approach** to managing pests in agricultural and other managed ecosystems and urban and rural communities.

SPM **builds on the concept and practice of integrated pest management (IPM)** and land stewardship to include the wider context of three sustainability pillars:

- Human Health and Social Equity
- Broadened Environmental Protections
- Economic Viability

“Sustainable Pest Management”

SEC. 3. Section 11412 is added to the Food and Agricultural Code, to read:

11412. “Sustainable pest management” means a holistic, whole system approach applicable to agricultural and other managed ecosystems and urban and rural communities that builds on the concept of integrated pest management to include the wider context of the three sustainability pillars: human health and social equity; environmental protection; and, economic vitality.

SEC. 5. Section 11520 is added to the Food and Agricultural Code, to read:

11520. (a) The Legislature finds and declares that it is important for California to implement sustainable pest management.

(b) In order to achieve the goal described in subdivision (a), it is the intent of the Legislature that the state do all of the following:

(1) Prioritize prevention and strengthen California’s commitment to pest prevention by doing both of the following fundamental actions:

- (A) Proactively preventing the
- (B) Proactively eliminating pe

(2) Coordinate state-level leader

- (A) Creating an accountable a
- (B) Identifying ways to impro
- (C) Enhancing the ability to cl
- (D) Prompting the developme

(3) (A) Invest in building susta
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(C) In urban pest manageme
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(4) Improve California’s pesticide registration processes and bring more alternative products to market by doing all of the following:

- (A) Creating mechanisms to improve the department’s registration review process and to prioritize and expedite safer, more sustainable products.
- (B) Requiring the department’s processes to reflect the goals of sustainable pest management and requiring the department to provide clarity on its scientific review and decisionmaking process for both registrants and the public.
- (C) Requiring the department to improve its processes for evaluating pesticides that are already registered.

(5) Enhance monitoring and data collection by significantly expanding and fully funding health and environmental monitoring infrastructure, data collection, and interpretation, which will enable the state to accurately track pesticide-related human illnesses and the presence of pesticides in land, water, air, biota, and structures and provide pesticide-use data and information needed for sound regulatory decisions.

Assembly Bill No. 2113

CHAPTER 60

all pest management practitioners have equal and
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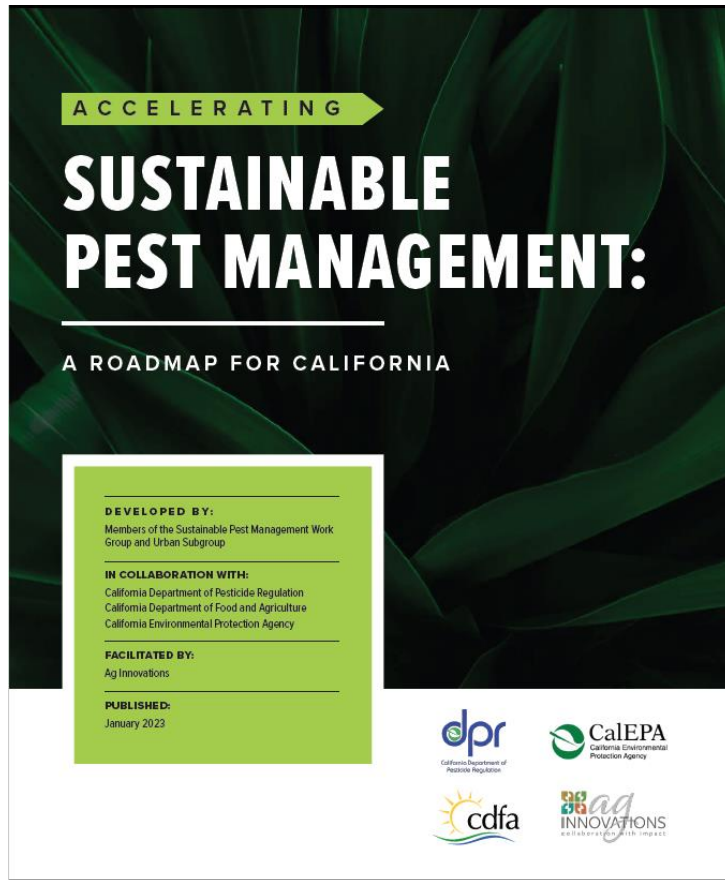
Why Sustainable Pest Management (SPM)?

Pest management is a critical practice in agriculture for supporting a stable, healthy food supply. Pest management is also necessary to protect public health.

- Need to address new and increasing pest pressures due to weather events and climate change.
- Further, currently available reduced-risk tools are declining in efficacy.
- Additionally, scientific studies are identifying significant impacts of high-risk pesticides that require increased restrictions on their use.

SPM builds on the practice of IPM to develop a systemwide approach to pest management.

The SPM Roadmap for California



Diverse, cross-sector work group convened by CalEPA, DPR & CDFA.

Two-year collaborative process to understand and address challenges of and opportunities for systemwide adoption of IPM, and improving health and environmental protection while supporting healthy food production.

Builds on existing IPM and land stewardship practice.

Roadmap released in Jan. 2023.

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The SPM Roadmap: 2050 Goals

1

BY 2050...

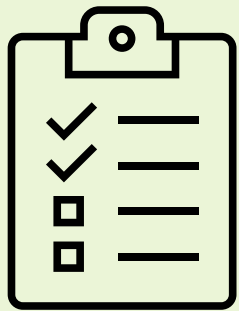
California has eliminated the use of Priority Pesticides³ by transitioning to sustainable pest management practices.

2

BY 2050...

Sustainable pest management has been adopted as the de facto pest management system in California.

Keystone Actions



- Prioritize **prevention**
- Coordinate state-level **leadership**
- Invest in alternatives research and building SPM **knowledge** (in agricultural and urban settings)
- Improve California's pesticide **registration** processes and bring alternative products to market
- Enhance **monitoring** and data collection



Prioritize Pest Prevention

By 2030: Coordinated state and regional collaboration and support CDFA High Risk Pest Exclusion Program.



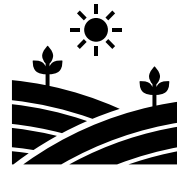
Improve Registration and Evaluation to Bring Alternatives to Market

By 2025: Improve DPR registration to prioritize and expedite low-risk alternatives and prioritize evaluation of highest risk registered pesticides



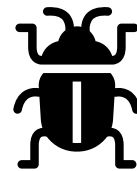
Alternatives: Expand Research and Development Infrastructure

By 2030: Bolster infrastructure and funding to support research to develop effective alternatives and prioritize viable SPM options.



Enhance Knowledge and Education

By 2030: All farms have access to free or affordable SPM training and technical assistance



Align Pest Control Advisors with SPM

By 2030: All PCAs have SPM training and promote SPM practices in the field



DPR's 2024-2028 Strategic Plan

- Reflects DPR's foundational role and sustainable pest management objectives and builds on recent budget and policy bill requirements
- Commitment to equity and environmental justice
- Specific, measurable goals:
 1. **Increase access to safe, effective, sustainable pest management**
 2. Track, evaluate and enforce safe pesticide use
 3. Foster engagement, collaboration and transparency
 4. Promote organizational excellence and innovation



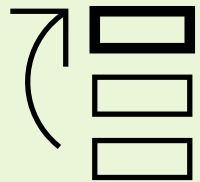
Increase Access to Safe, Effective, Sustainable Pest Management

1. Develop public and private **partnerships and collaborations** for implementing sustainable pest management.
2. Improve **timeliness and transparency** of science-based evaluation and registration of pesticide products.
3. Develop and implement a **science-based prioritization process** for reviewing, identifying and evaluating high-risk pesticides, their alternatives and related mitigation measures.
4. Facilitate and support **SPM technical assistance** and innovation in pest management in collaboration with interested parties.

Reevaluation	Stages with estimated completion dates (quarter [Q] and year)
<u>Chloropicrin</u>	Chloropicrin Manufacturer’s Task Force (CMTF) to complete study 4 and preliminary report by Q3 2025. CMTF to complete studies 1, 2, and 3 by Q4 2025. Determine need for CMTF Study 5 by Q4 2025. Complete of review of all required CMTF studies by Q2 2027. If mitigation or rulemaking is required, complete by Q2 2029.
<u>Cyfluthrin</u>	Publish Human health risk assessment scope by Q2 2025. Complete risk human health risk assessment by Q4 2026. If mitigation or rulemaking is required, complete by Q4 2028.
<u>Diphacinone</u>	Conduct informal public workshops on proposed mitigation by Q3 2025. Complete scientific evaluation and determination of need for mitigation by Q4 2026. If mitigation or rulemaking is necessary, complete by Q3 2028.
Non-Agricultural Outdoor Neonicotinoids 1	Completed draft human health risk assessment for imidacloprid Q1 2024. Complete final imidacloprid human health risk assessment by Q1 2025. Complete draft human health risk assessments for acetamiprid, clothianidin, dinotefuran, and thiamethoxam by Q1 2025. Complete evaluation of impact of neonicotinoid pesticides on aquatic organisms by Q3 2025. Complete final human health risk assessments for acetamiprid, clothianidin, dinotefuran, and thiamethoxam by Q1 2026. Issue reevaluation determination of neonicotinoid pesticides' impacts to pollinating insects, aquatic organisms, and human health by Q3 2027. If mitigation or rulemaking is necessary, complete by Q3 2029.
Paraquat Dichloride 2	Publish preliminary scientific reports and open 45-day public comment period by Q4 2024. Review public comments and issue planned next steps by Q2 2025. If mitigation or rulemaking is required, complete by Q1 2029.
<u>Second-Generation Anticoagulant Rodenticides (SGARs)</u>	Conduct informal public workshops on proposed mitigation by Q3 2025. Complete scientific evaluation and determination of need for mitigation by Q4 2026. If mitigation or rulemaking is necessary, complete by Q3 2028.

Reevaluation

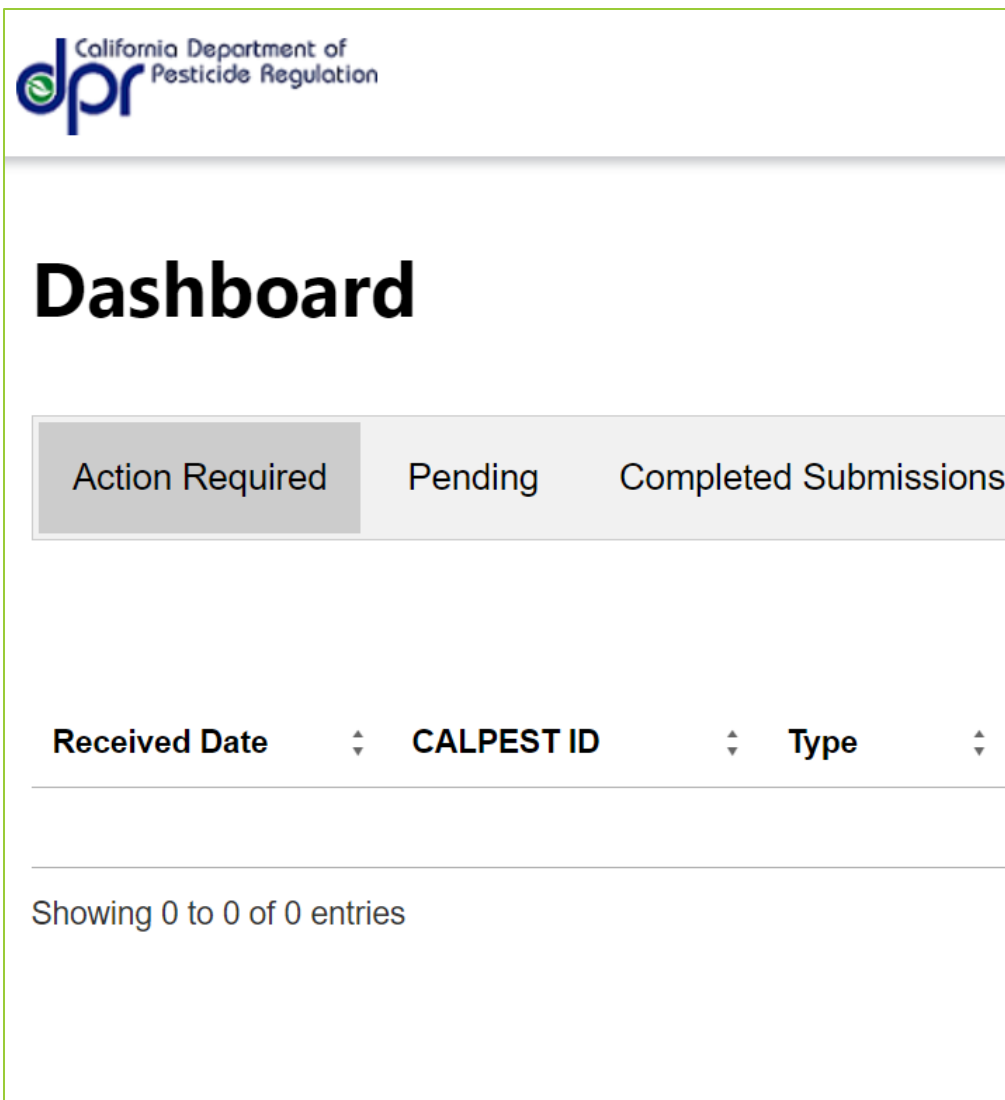
Signaling Priority Pesticides Process & Advisory Committee



DPR is in the process of developing a proposed priority pesticide process and advisory committee structure.

Purpose: Identify and signal the need to reduce use of Priority Pesticides, a subset of **high-risk pesticides**. High risk pesticides are active ingredients that are highly hazardous and/or uses that are likely to cause significant human health or environmental impacts.

Priority Pesticide Identification: by DPR informed by advice from advisory committee and public input. The criteria for Priority Pesticides include: hazard and risk classifications, availability of alternatives and high-risk pest management situations.



Launch of CalPEST

- The California Pesticide Electronic Submission Tracking system (CalPEST) is a single information management system to combine all the current registration processes and offer online functions to stakeholders.
- CalPEST is a key milestone in streamlining and modernizing DPR's registration process.

**Improve Registration and Evaluation to
Bring Alternatives to Market**



Evaluating Biologicals

- DPR is developing procedures for **evaluating novel technologies like biopesticides** and to accelerate research authorization review to collect and analyze field data on these emerging technologies.
- This work is critical to develop longer-term evaluation guidelines for the emerging technologies that could serve as effective, safer and viable alternatives to traditional and higher-risk pesticides.



Fumigant Alternatives Study

- Legislature funded independent study of fumigant alternatives to assess:
 - Present state of fumigant use in and outside of California
 - Current laws and regulations outside of California
 - Current state of research into fumigant alternatives
 - Availability/feasibility of fumigant alternatives
 - Areas where additional research is necessary to develop practical, scalable, safe alternatives.
- This study began in December 2023.



IPM Grant Funding

- **2021** - \$925K awarded
- **2022** - \$5.5 million awarded
- **2023** - \$4.2 million awarded
- **2024** - \$2.6 million grant funding awarded



DPR Grant Funded Project Examples

- UC ANR research toward the potential of reducing soil fumigation in California's seedless watermelon using grafting and Trichoderma-containing biologics.
- UC Riverside research toward alternatives to soil fumigants in California's fresh market carrot production
- UC IREC evaluation of alternatives to soil fumigants and diallyl disulfide for the management of white rot in allium crops.

Additional SPM Work

- Cross-Agency Working Group with 30 state agencies
- Pilot projects showcasing SPM in practice (in urban areas and schools, in the context of extreme heat)
- Landscape analysis of certifications and understanding procurement
- Partnerships, including with UC



SPM Next Steps

- The transition to Sustainable Pest Management will require ongoing engagement and collaboration among all parties.
- 2024-25 State budget implements an increase in the mill to fund DPR's essential work-- including accelerating registration and evaluation processes to bring safe, effective pest management tools to market faster.
- Continue to invest in IPM grants to advance safe, effective and sustainable pest management

Thank you!

For more information on the SPM Roadmap and DPR priorities, visit www.cdpr.ca.gov